

REMARKS

Claims 1-72 and 99-103 are pending in the present application. Claims 1-36, 63-67, and 99-103 are withdrawn following a restriction requirement. Claims 37-62 and 68-72 are therefore being examined. Applicants reserve the right to pursue the unelected claims in a divisional application.

Claims 37-39, 41-44, 47, and 49 have been amended to correct typographic errors and/or to clarify the subject matter recited therein. The amendments do not add new matter.

The Office Action rejects claims 37-62 and 68-72. Applicants respectfully traverse.

Claims 49-50 are rejected under 35 U.S.C. § 112, second paragraph, as being indefinite. Claim 49 has been amended to clarify that the mixture refers to two members of the group recited in the claim. It is therefore respectfully submitted that the claims are allowable.

Claims 37, 46-58, 62, 68, 70, and 72 are rejected under 35 U.S.C. § 102(e) as being anticipated by U.S. Patent No. 6,562,487 to Vas'ko et al. (hereinafter Vas'ko).

Independent claim 37 relates to a magnetic head that includes, *inter alia*, an **insulating layer formed on a recording gap layer** except for a pole tip region. Applicants respectfully submit that this feature is not disclosed, or even suggested, in Vas'ko. The Office Action cites element 318 of Vas'ko as disclosing a recording gap layer and element 324 of Vas'ko as disclosing an insulating layer. Without admitting the propriety of these assertions, Applicants respectfully submit that the relationship between these features, as recited in claim 37, is not disclosed in Vas'ko. In particular, coil insulator 324 is not formed on writer gap layer 318 in any of the figures in Vas'ko. Additionally, the specification of Vas'ko recites that:

[w]riter gap layer **318** is formed on top and *at a pole tip end* of shared pole layer **316**. Also coil insulator **324** is formed on top and *away from the pole tip end* of shared pole layers **316**.

(Vas'ko Specification; col. 3, lines 48-51; emphasis added). As is apparent from the quoted section, writer gap layer 318 is formed at a pole tip end, while coil insulator 324 is formed away from the pole tip end. Therefore, coil insulator layer 324 is not formed on top of gap layer 318, as is apparent from figures 3-5. Since Vas'ko does not disclose, or even suggest, an insulating layer formed on a recording gap layer except for a pole tip region, the reference does not anticipate claim 37. It is therefore respectfully requested that the rejection be withdrawn.

Claim 37 also recites an antistripping layer formed on an insulating layer and on the pole tip region of a recording gap layer. Amended claim 37 recites that the antistripping layer includes a non-magnetic layer formed on said insulating layer and on the pole tip region of said recording gap layer. Applicants respectfully submit that Vas'ko does not disclose, or even suggest, the above-mentioned features of claim 37, and therefore for at least this additional reason the rejection of claim 37 should be withdrawn.

Claims 46-58, and 62 depend from claim 37 and are therefore allowable for at least the same reasons as claim 37 is allowable. Claims 68, 70, and 72 relate to a magnetic storage unit comprising a magnetic head as claimed in claim 37 or one of its dependent claims. Therefore, claims 68, 70, and 72 are allowable for at least the same reasons as claim 37 is allowable.

Claims 37-40, 44-45, and 62 are rejected under 35 U.S.C. § 102(e) as being anticipated by U.S. Patent No. 6,296,955 to Hossain et al. (hereinafter Hossain). The Office Action asserts that element 62 of Hossain discloses a non-magnetic layer on an insulating layer forming an anti-stripping layer. However, element 62 is primarily NiFe (Hossain; col. 5, lines 7-8), and therefore element 62 is at least partly magnetic. An alternative composition for element 62 presented in Hossain is Cr (Hossain; col. 5, lines 12-13). However, as the Office Action admits on page 9,

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paragraph 10, Hossain does not disclose a non-magnetic layer made of a non-magnetic material of one of titanium (Ti) and tantalum (Ta), as recited in amended claim 37. Hossain does not identically disclose, or even suggest, all of the features of amended claim 37, and therefore Hossain does not anticipate claim 37.

Claims 37-40, 44-45, and 62 depend from claim 37 and are therefore allowable for at least the same reasons as claim 37 is allowable.

Claims 37 and 61 are rejected under 35 U.S.C. § 102(b) as being anticipated by U.S. Patent No. 6,473,960 to Schwartz et al. (hereinafter Schwartz). Schwartz does not identically disclose the features of amended claim 37, namely that the anti-stripping layer includes a non-magnetic layer formed on an insulating layer and on a pole tip region of a recording gap layer and that the non-magnetic layer is made of a non-magnetic material of one of titanium (Ti) and tantalum (Ta). Therefore, claim 37, and claim 61, which depends from claim 37, are allowable over Schwartz.

Claims 41-43 are rejected 35 U.S.C. § 103(a) as being unpatentable over Hossain. The Office Action admits that Hossain does not identically disclose the features of amended claim 37 as formerly recited in claim 41. In particular, the Office Action on page 8, paragraph 10 admits that Hossain does not disclose an anti-stripping layer that includes a non-magnetic layer formed on an insulating layer and on a pole tip region of a recording gap layer in which the non-magnetic layer is made of a non-magnetic material of one of titanium (Ti) and tantalum (Ta). The Office Action asserts that it would have been obvious to modify the materials for the anti-stripping layer in the manner recited in the claims. However, this conclusory reasoning is insufficient to support a claim of obviousness. There is apparently no mention in Hossain of either titanium or tantalum, and therefore no indication that these materials may be used as a

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layer in an anti-stripping layer. The Office Action concludes, without support, that these features are "achievable through routine optimization/experimentation." (Office Action; page 8, paragraph 10). Applicants respectfully disagree and request a specific citation in support of the materials recited, or alternatively, that the rejection be withdrawn.

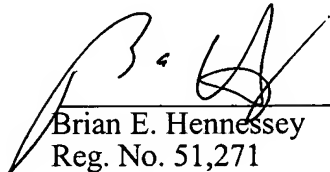
Claims 69 and 71 are rejected 35 U.S.C. § 103(a) as being unpatentable over Schwartz or Hossain in view of Vas'ko. Claims 69 and 71 relate to a magnetic storage unit comprising a magnetic head as claimed in claim 37 or one of its dependent claims, and are therefore allowable for at least the same reasons as claim 37 is allowable.

Claims 59 and 60 are rejected 35 U.S.C. § 103(a) as being unpatentable over Vas'ko. Claims 59 and 60 depend from claim 37 and are therefore allowable for at least the same reasons as claim 37 is allowable.

In view of the remarks set forth above, Applicants submit that the application is in condition for allowance. However, if for any reason the Examiner should consider this application not to be in condition for allowance, the Examiner is respectfully requested to telephone the undersigned attorney at the number listed below prior to issuing a further Action.

Any fee due with this paper may be charged to Deposit Account No. 50-1290.

Respectfully submitted,



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